

BLANK PAGE



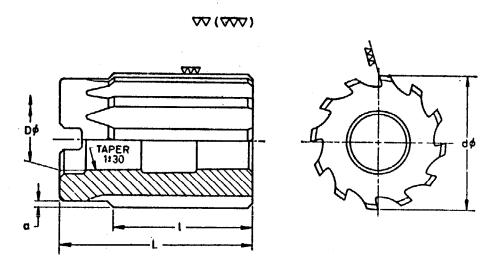


Indian Standard

SPECIFICATION FOR SHELL REAMERS

1. Scope — Dimensions and requirements for shell reamers with taper bore and cross-slot-drive.

2. Dimensions



All dimensions in millimetres.

Range of Diameters d*		Dţ	1	L	a Max
Above	Up to and Including		,		
19.9	23.6	10	28	40	1.0
23.6	30.0	13	32	45	1.0
30 0	35.5	16	36	50	1.5
35·5	42.5	19	40	56	1.5
42.5	50.8	22	45	63	1.5
50.8	60.0	27	50	71	2.0
60.0	71.0	32	56	80	2.0
71.0	85.0	40	63	90	2.2
85.0	101.6	50	71	100	2.2

Note — The figure is indicative of dimensions only and does not specify design features.

3. Designation — A shell reamer with diameter d = 50 mm suitable for a hole with tolerance H8 and conforming to this standard and made from high speed steel (HS) shall be designated as:

Reamer 50 IS: 5926-HS

3.1 When the reamer is required for a hole with tolerance other than H8, the appropriate hole tolerance shall be included in the designation after size.

Adopted 4 December 1970

© June 1971, ISI

Gr 1

^{*}The tolerance on diameter d shall be m6.

 $[\]dagger$ The bore diameter D is the same as nominal arbor diameter D according to IS: 5936-1970 ' Arbors with morse taper shanks for shell tools'.

4. Tolerances on Flute Length and Overall Length

	Length, mm	Tolerance mm	
Over	Up to and including		
6 18 50	6 18 50	± 1·5 ± 3·0 ± 5·0 ± 6·5	

5. General Requirements

- 5.1 Nominal diameter d shall be chosen from the range of diameters d.
- 5.2 Bevel Lead Angle 45°.
- 5.3 Back taper on diameter is recommended. The back taper if provided shall be within the limits of tolerance on the diameter.
- 5.4 Flutes unless specified otherwise: Parallel flutes for right-hand cutting.
- 5.5 Dimensions for tenons and cross-slots according to IS: 5568-1970 'Dimensions for tenons and cross-slots for tools with bore taper 1:30'.
- 5.6 Dimensions of arbors according to IS: 5936-1970 'Arbors with morse taper shanks for shell tools'.
- 5.7 Other requirements according to IS: 5443-1969 'Technical supply conditions for reamers'.

EXPLANATORY NOTE

In order to bring in line with the work done at ISO level, the Small Tools Sectional Committee, EDC 45, decided to revise IS: 1836-1961 'Specification for reamers' and split it up into a series of standards. This standard is one of the series and covers the dimensional requirements for shell reamers. The technical supply conditions for reamers and the dimensional requirements of various other reamers are covered in separate standards.

AMENDMENT NO. 1 NOVEMBER 1990 TO

IS 5926:1970 SPECIFICATION FOR SHELL REAMERS

(Page 2, clause 5.3) - Substitute the following for the existing clause:

"5.3 <u>Back Taper</u> - Back taper on the cutting diameter is recommended; when provided the amount of back taper shall be in accordance with IS 5443:1984 'Technical supply conditions for high speed steel reamers'."

(PED 10)

Reprography Unit, BIS, New Delhi, India

AMENDMENT NO. 2 DECEMBER 1996 TO

IS 5926: 1970 SPECIFICATION FOR SHELL REAMERS

(Page 1, clause 2, informal table, last line) — Substitute 'IS 5936: 1981' for 'IS 5936: 1970'.

(Page 1, clause 3, lines 2 and 3) — Substitute 'HSS' for 'HS'

(Page 2, clause 5.5) — Substitute 'IS 5568: 1978' for 'IS 5568: 1970'.

(Page 2, clause 5.6) — Substitute 'IS 5936:1981' for 'IS 5936:1970'.

(Page 2, clause 5.7) — Substitute 'IS 5443: 1994' for 'IS 5443: 1969'.

(PE 10)

Reprography Unit, BIS. New Delhi, India